

AMENDMENTS TO THE SPECIFICATION

Paragraph on page 1, lines 4 to 7 (Currently Amended):

This application is a continuation of co-pending United States Patent Application Serial No. 09/902,313 filed 10 July 2001 (now abandoned) which is a continuation of application Serial No. 09/082,946 filed 21 May 1998 (now United States Patent No. 6,267,745).

Paragraph on page 4, lines 15 to 29 (Currently Amended):

As Figs. 2A and 2B show[.], the system 30 includes an air tube 44, which is confined within the dry transfer container 34. The air tube 44 communicates with the transfer tubing 36 and extends a certain distance into the dry transfer container 34. The air tube 44 contains a volume of residual air (shown as V1 in Fig. 2B). The space 128 created between the air tube 44 and the side walls 130 of the container 34, when in a normally empty condition, also contains a volume of residual air (shown as V2 in Fig. 2B). Together, the residual air volume of the air tube 44 and the residual air volume of the space 128 contain comprise an incremental volume of air ($V_i = V_1 + V_2$) within the closed system 30. The presence of this incremental air volume V_i obviates the need to introduce added helium or air during manufacture to prevent collapse and sticking of the transfer container 34 and tubing 36.

Paragraph beginning on page 4, line 30, and ending on page 5, line 3 (Currently Amended):

The practitioner can empirically select an incremental air volume (V_i) sufficient to prevent collapse and sticking of the transfer container 34 and tubing 36 during heat sterilization. Generally stated, the magnitude of the ~~incremental~~ residual air volume (V_1) inside the air tube 44 is defined by the interior radius (R) and length (L) of the air tube 44, according to the following expression for the volume of a cylinder:

$$V_1 = \pi R^2 L$$

Paragraph on page 5, lines 4 to 18 (Currently Amended):

Also generally stated, the magnitude of the ~~additional~~ residual air volume (V_2) is dependent principally upon the exterior radius and length of the air tube 44, about which the space 128 extends,

as well as the surface area, flexibility and other physical properties of the container walls 130, which affect the geometry to which the walls 130 conform about the tube 44. As Fig. 2B shows, the flexible walls 130, when the container 34 is empty, define a space 128 about the air tube 44, which can be expected to be generally elliptical in cross section, with the magnitude of the major axis of the space 128 exceeding the magnitude of the outside diameter of the air tube 44. Due to this geometry, the ~~additional~~ residual air volume (V2) ~~encompasses the tube 44 and of the space 128~~ can be expected to be significantly larger than the ~~tube~~ residual air volume (V1) of the air tube 44.

Paragraph on page 5, lines 19 to 24 (Currently Amended):

For example, in a typical embodiment, the air tube 44 itself can provide ~~an a~~ a residual air volume (V1) of about 1.3 ml. In this arrangement, the space 128 created by the walls 130 conforming about the air tube 44 can provide ~~an additional~~ a residual air volume (V2) of about 19 ml, for a total incremental air volume V_i of about 20 ml.

Paragraph on page 8, lines 12 to 17 (Currently Amended):

The residual air volumes contained within the air tube 70 and the space created about it within the dry air reservoir 72, serve as the sources of an incremental volume of air (V_i) within the closed system 50. The presence of this incremental air volume (V_i) obviates the need to introduce added helium or air during manufacture to prevent collapse and sticking of the transfer tubing ~~36~~ 54.

Paragraph beginning on page 8, line 18, and ending on page 9, line 1 (Currently Amended):

In a representative embodiment of the type shown in Fig. 3A, the air reservoir 72 measures about 80 mm by about 100 mm (between interior seals), for an interior volume of about 100 ml. The air tube 70 has an interior radius of about 9 mm and measures about 100 mm in length, providing ~~an incremental~~ a residual air volume (V1) of about 1.3 ml. ~~An incremental~~ A residual air volume (V2) of about 19 ml surrounds the air tube 70 within the reservoir 72, so that the total incremental air volume ($V_i = V1 + V2$) is about 20 ml. The total volume of the transfer tubing 54 upstream of the frangible cannula 68 is about 12 ml. The total volume of the transfer tubing and the chamber 60 below the frangible cannula 68 is about 50 ml. The incremental air volume (V_i) of about

20 ml in this embodiment is sufficient to prevent collapse and sticking of the transfer tubing 54 during steam sterilization, without the injection of added helium or air. As will be described later, the volume of the air reservoir 72 is also sufficient to receive substantially all ~~residual~~ air vented from the chamber 60.